

REMARKS

1. Claims 19-20 Allowed

Applicants gratefully acknowledge that the Examiner has allowed independent claims 19 and 20.

2. Allowable Subject Matter

Applicants gratefully acknowledge that the Examiner would allow claim 17 if rewritten or amended to overcome the rejection(s) under 35 U.S.C. § 112, second paragraph. Applicants have amended claim 17 in accord with the Examiner's request and respectfully submit that it is now in condition for allowance.

3. Objection to the Specification

Applicants note that box 9 "The specification is objected to by the Examiner" was checked off in the Office Action and not commented upon by the Examiner in the Detailed Action. Applicants respectfully request that the objection to the specification be withdrawn, unless there is an additional issue that the Examiner believes should be addressed.

4. Claim Rejections – 35 U.S.C. § 112

In the Office Action, the Examiner rejected claims 3-5, 8-11 and 17 under 35 U.S.C. § 112, second paragraph. Applicants respectfully traverse this rejection.

A. Claim 3

On Page 3 of the Office Action, the Examiner stated that "it is unclear whether the seal member is the same as the viscoselective high pressure seal or whether it is in addition to the viscoselective high pressure seal." The Examiner also stated that "it is unclear what element it is which would further define the viscoselective high pressure seal."

Applicants have amended claim 3 to read "The syringe of claim 1, wherein the plunger comprises a distal tip portion adapted to define the viscoselective high pressure seal, the distal tip portion comprising..." In light of the amendment to claim 3, Applicants respectfully submit that the rejection to claim 3 under § 112 has been overcome.

B. Claims 3-5, 8-11

On Page 3 of the Office Action, the Examiner stated that “it is unclear whether applicant is intending to positively recite the elements of the plunger.” The Examiner continued, “Applicant should amend the language to positively recite the elements of the plunger or make clear that the plunger is not intended to be claimed.” In light of the amendment to claim 3 discussed above, Applicants respectfully submit that the rejection to claims 3-5 and 8-11 under § 112 has been overcome.

C. Claim 17

On Page 3 of the Office Action, the Examiner stated that “it is unclear what the aperture is effectively inhibiting.” Applicants have amended claim 17, adding “passage of viscous material.” In light of the amendment to claim 17, Applicants respectfully submit that the rejection to claim 17 under § 112 has been overcome.

4. Claim Rejections – 35 U.S.C. § 102(b)

In the Office Action, the Examiner rejected claims 1-3, 5, 8, 10, and 14-16 as anticipated by the prior art under 35 U.S.C. § 102(b). Applicants respectfully request reconsideration of Claims 1-3, 5, 8, 10, and 14-16, including independent claims 1 and 14.

A. Sams (U.S. Patent No. 4,865,591)

The Examiner rejected claims 1-3, 5, and 14-16 under 35 U.S.C. § 102(b) as being anticipated by Sams. Applicants respectfully traverse this rejection.

Independent claims 1 and 14 both require a viscoselective high pressure seal. The required viscoselective high pressure seal is “one which is effective against viscous fluid but does not act as a seal against non-viscous fluids such as air,” as defined by the specification on page four of the application filed on June 6, 2001.

A rejection under 35 U.S.C. § 102 requires every element in the proposed claims to be disclosed by the prior art. The Examiner has not explained how or asserted that the prior art reference discloses a viscoselective high pressure seal. Hence, the Examiner has failed to make a prima facie § 102(b) showing with respect to independent claims 1 and 14. Therefore,

Applicants respectfully request that the rejection of claims 1 and 14 under 35 U.S.C. § 102(b) be withdrawn.

Dependent claims 2-3 and 5 depend upon claim 1. Dependent claims 15-16 depend upon claim 14. Therefore, Applicants respectfully submit that the Examiner's rejection has been overcome.

B. Box et al. (U.S. Patent No. 4,832,692)

The Examiner rejected claims 1-3, 5, 8, 10 and 14 under 35 U.S.C. § 102(b) as being anticipated by Box et al. Applicants respectfully traverse this rejection.

Independent claims 1 and 14 both require a viscoselective high pressure seal. The required viscoselective high pressure seal is "one which is effective against viscous fluid but does not act as a seal against non-viscous fluids such as air," as defined by the specification on page four of the application filed on June 6, 2001.

A rejection under 35 U.S.C. § 102 requires every element in the proposed claims to be disclosed by the prior art. The Examiner has not explained how or asserted that the prior art reference discloses a viscoselective high pressure seal. Hence, the Examiner has failed to make a prima facie § 102(b) showing with respect to independent claims 1 and 14.

Additionally, on page 4 of the Office Action, the Examiner stated that "Box et al. disclose a syringe comprising a chamber, a plunger 60 movably axially with respect to the chamber, a connector 15 and a seal member 56 in circumferential o-ring seats 55." However, Box et al. discloses a piston assembly that "prevent[s] fluid by-pass during operation of the syringe assembly." Col. 5, ll. 16-18. The common definition of the term "fluid" includes liquid or gas. MERRIAM-WEBSTER'S COLLEGIATE DICTIONARY 448 (10th ed. 2002). Hence, Box et al. explicitly discloses a piston assembly that prevents the by-pass of both liquid and gas. Accordingly, Box et al. teaches away from the use of a viscoselective high pressure seal. Therefore, Applicants respectfully submit that the Examiner's rejection of claims 1 and 14 under 35 U.S.C. § 102(b) has been overcome.

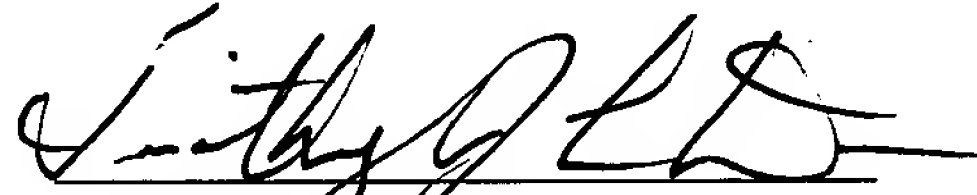
Dependent claims 2-3, 5, 8, and 10 depend from independent claim 1 and include limitations that further distinguish them from Box et al. For example, claim 5 requires a seal member that is an O-ring of material having a limited resilience. Box et al. does not disclose

this feature. *See* Col. 5, ll. 12-15. Furthermore, claim 10, requires that the seal seat permit slight axial movement of the seal member within the seat member. Box et al. only discloses “at least one, and preferably a pair of, annular O-ring seats 55 in which O-rings 56 are positioned.” Col. 5, ll. 12-15. Accordingly, Box et al. does not disclose a seal seat that permits slight axial movement of the seal member within the seat member. Hence, Applicants respectfully submit that the Examiner’s rejection of dependent claims 2-3, 5, 8, and 10 has been overcome. Therefore, Applicants respectfully request that the rejection of claims 1-3, 5, 8, 10 and 14 under 35 U.S.C. § 102(b) as being anticipated by Box et al. be withdrawn.

SUMMARY

Applicants respectfully submit that all of the pending claims are in condition for allowance and seek early allowance thereof. If for any reason the Examiner is unable to allow the application but believes that an interview would be helpful to resolve any issues, he is respectfully requested to call the undersigned at (312) 321-4277.

Respectfully submitted,



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Dated: April 15, 2004